

AMENDMENTS TO THE CLAIMS

This listing of claims will replace all prior versions, and listings, of claims in the application:

Claims 1-22 (canceled)

Claim 23 (withdrawn): An isolated human endothelin receptor having an affinity for endothelins 1 and 2, comprising an amino acid sequence from Asp at 1 to Asn at 407 of SEQ ID NO: 1.

Claim 24 (withdrawn): An isolated human endothelin receptor precursor comprising an amino acid sequence from Met at -20 to Asn at 407 of SEQ ID NO: 1.

Claim 25 (withdrawn): A method for identifying an agonist or an antagonist of a human endothelin receptor, comprising the steps of:

contacting a sample comprising an endothelin receptor according to claim 23 with a candidate compound; and

detecting binding of the candidate compound to the endothelin receptor.

Claim 26 (withdrawn): The method of claim 25, wherein the sample comprises a cell expressing the receptor of claim 23.

Claim 27 (withdrawn): The method of claim 26, wherein the cell contains a DNA molecule comprising a nucleic acid sequence from G at 545 to C at 1765 shown in SEQ ID NO: 1.

Claim 28 (withdrawn): A method of manufacturing a pharmaceutical composition,

comprising the steps of:

screening a library of candidate compounds by:

contacting a sample comprising an endothelin receptor according to claim 23 with each candidate compound in the library,

detecting binding of the candidate compound to the endothelin receptor, and

identifying compounds which bind to the endothelin receptor;

selecting an target compound identified from the library; and

formulating said target compound with a pharmaceutically acceptable carrier.

Claim 29 (withdrawn): The method of claim 28, wherein the sample comprises a cell expressing the receptor of claim 23.

Claim 30 (withdrawn): The method of claim 29, wherein the cell contains a DNA molecule comprising a nucleic acid sequence from G at 545 to C at 1765 shown in SEQ ID NO: 1.

Claim 31 (withdrawn): A pharmaceutical composition produced by the method of claim 28.

Claim 32 (withdrawn): A method of modulating an endothelin receptor, comprising the steps of:

screening a library of candidate compounds by:

contacting a sample comprising an endothelin receptor according to claim 23 with each candidate compound in the library,

detecting binding of the candidate compound to the endothelin receptor, and

identifying compounds which bind to the endothelin receptor;

selecting a target compound identified from the library; and

contacting the endothelin receptor with the target compound.

Claim 33 (withdrawn): The method of claim 32, wherein the sample comprises a cell expressing the receptor of claim 23.

Claim 34 (withdrawn): The method of claim 33, wherein the cell contains a DNA molecule comprising a nucleic acid sequence from G at 545 to C at 1765 shown in SEQ ID NO: 1.

Claim 35 (currently amended): A method of ~~treating a circulatory system disease in a subject, comprising the steps of:~~

screening a library of candidate compounds, comprising the steps of by:

contacting a sample comprising a human endothelin receptor having an affinity for endothelins 1 and 2, comprising an amino acid sequence from Asp at 1 to Asn at 407 of SEQ ID NO: 1 with each candidate compound in the library,

detecting binding of the candidate compound to the endothelin receptor, and

identifying compounds which bind to the endothelin receptor; and

selecting a target compound identified from the library; ~~and~~

~~administering the target compound to the subject.~~

Claim 36 (currently amended): The method of claim 35, wherein the sample comprises a cell expressing a human endothelin receptor having an affinity for endothelins 1 and 2, comprising an amino acid sequence from Asp at 1 to Asn at 407 of SEQ ID NO: ~~[[2]]~~ 1.

Claim 37 (previously presented): The method of claim 36, wherein the cell contains a DNA molecule comprising a nucleic acid sequence from G at 545 to C at 1765 shown in SEQ ID NO: 1.

Claim 38 (withdrawn): A method of determining ET-1 or ET-2 in a sample, comprising the steps of:

contacting the sample with an endothelin receptor according to claim 23, wherein the endothelin receptor is present on a cell membrane; and

detecting binding of the sample to the endothelin receptor.

Claim 39 (withdrawn): The method of claim 38, wherein the cell contains a DNA molecule comprising a nucleic acid sequence from G at 545 to C at 1765 shown in SEQ ID NO: 1.